

DETAILED ACTION

Allowable Subject Matter

Applicant has amended the independent claims 5 and 17 to overcome the prior art rejection of the previous office action. Claims , 7-17, and 19-20 are allowed. The following is an examiner's statement of reasons for allowance:

The prior art of record does not disclose or suggest either in singularly or in combination the following limitations and other elements in the claims:

References Bryant et al. (US Pub. 2005/0285187) and de Souza et al. (US Pub. 2005/0116290) do not disclose:

- Bonding a first wafer having a first surface direction atop a second wafer having a different second surface direction, Where the first wafer including a buried oxide layer.
- Forming an opening through the first wafer to the second wafer and forming a region in the opening having second surface direction.
- Implanting an oxygen and performing annealing.

Reference Machesney et al. (US 5,670,388) do not disclose:

- Machesney et al. disclose bonding a first wafer atop a second wafer, but do not disclose both wafers having different surface direction.
- Forming an opening through the first wafer to the second wafer and forming a region in the opening having second surface direction.
- Implanting an oxygen and performing annealing.

Reference Hu et al. (US 4,908,328) do not disclose:

- Hu et al. disclose bonding a first wafer atop a second wafer, but do not disclose both wafers having different surface direction.
- Hu et al. disclose forming an opening and forming a region in the opening, but do not disclose the surface direction of the region.
- Implanting an oxygen and performing annealing.

Therefore, the above references do not disclose the claimed invention of present application and claims 5, 7-17, and 19-20 are allowed.

Any comments considered necessary by applicant must be submitted no later than the payment of the issue fee and, to avoid processing delays, should preferably accompany the issue fee. Such submissions should be clearly labeled "Comments on Statement of Reasons for Allowance."

Any inquiry concerning this communication or earlier communications from the examiner should be directed to Wai-Sing Louie whose telephone number is 571-272-1709. The examiner can normally be reached on 7:30 to 5:00.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Wael Fahmy can be reached on 571-272-1705. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free). If you would like assistance from a USPTO Customer Service Representative or access to the automated information system, call 800-786-9199 (IN USA OR CANADA) or 571-272-1000.

/Wai-Sing Louie/
Primary Examiner, Art Unit 2814

Wsl
December 18, 2007.